The Halifax Amateur Radio Club



# REFLECTOR

PO BOX 663 HALIFAX NS B3J 2T3

HARC Club Station phone number - 490-6421

April 2008 Volume 69 Number 4 club web site is http://www.halifax-arc.org



# 2008 is the HARC's 75th Anniversary Year



Executive	III III C	nuo station	phone number 190 0 121
President - Bill Elliott, VE1MR		865-8567	ve1mr@rac.ca
First V.P Murray MacDonald, V	E1MMD	876-0661	twomacds@ns.sympatico.ca
2nd V.P Tom Gaum, VE1BMJ		445-8103	tgaum2@ns.sympatico.ca
Secretary - Helen MacRae, VE1H	MR	422-7119	ve1hmr@rac.ca
Treasurer - Fraser MacDougall VE	E1WO	865-4198	ve1wo@rac.ca
Director-at-Large: - Doug LeBlan	c, VE1LDL	465-4665	leblanc@accesscable.net
Club Station Mgr Brian Allan, V	/E1AZV	489-4656	basailor@eastlink.ca
Past President - Bob Swinwood, V	E1PO	860-4454	bob swinwood@hotmail.com

#### **Committees/Offices/Prime Contacts**

Government liaison – Murray MacDonald, VE1MMD 876-0661 twomacds@ns.sympatico.ca QSL Bureau Mgr - Tom Caithness, VE1GTC 477-7081 tom.caithness@ns.sympatico.ca EMO Co-ordinator - Dave George, VE1AJP dgeorge@dal.ca 466-8723 Reflector editor - Lynn Bowser, VE1ENT 865-8567 ve1ent@rac.ca Reflector Dist. - Howard Dickson, VE1DHD 823-2024 dhdickson@hfx.eastlink.ca Membership - Howard Dickson, VE1DHD 823-2024 dhdickson@hfx.eastlink.ca Web page – Rob Ewert, VE1KS, 826-1705 ewertr@hfx.eastlink.ca EMO Trailer co-ordinator – David Musgrave, VE1EDA 435-4333 ve1eda@rac.ca Safety Officer – Terry Bigelow, VE1TRB ve1trb@eastlink.ca NSARA Director - Scott Wood, VE1QD ve1qd@rac.ca 823-2761 Basic ham course - Barry Diggins, VE1TRI 861-3719 ve1tri@rac.ca 75th Anniversary Chair – Bill Elliott, VE1MR 865-8567 ve1mr@rac.ca 2008 Flea market Chair – Fraser MacDougall VE1WO 865-4198 ve1wo@rac.ca Field Day coordinator – John Bartlett, VE1OZ 832-2119 iohnbartlett@eastlink.ca Honorary Legal counsel - Paul Radford, VE1ARH

#### Non Club Contacts

RAC Atlantic Dir. - Len, VE9MY (506) 847-5656 lmorgan@nbnet.nb.ca Assistant Director of RAC for HRM Scott Wood, VE1QD, 823-2761 ve1qd@rac.ca

#### **Take-15 Net Controllers**

### **NOTE: There have been some changes.**

This will be the rotation.

If you cannot take the net on your particular evening get in touch with one of the others and trade places with them. If I have left any one off the list, **or you want to join**, please let Bill Elliott, VE1MR, know.

April	13	Doug	VE1LDL	
April	20	Pierre	VE1PTR	
April	27	Win	VE1WIN	
May	4	Herb	VE1HX	
May	11	Emil	VE1ESP	ŧ
May	18	Chris	VA1CDB	ì
May	25	Charles	VE1MCR	_

#### Puzzler - Do you know?

If you were concerned about GHA, what part of the hobby would you be involved in?

Answer is on page 7

From Murphy's Lesser Known Laws & Truths:

Change is inevitable, except from a vending machine.

The regular Monthly Meeting of the Halifax Amateur Radio Club will take place Wednesday, April 16, 2008 at 1930 hours (7:30 PM) in the Seniors room in the Saint Andrews Recreation Center.

The evening's program: Murray, VE1MMD, on the HARC, anticipating the future.

Guests are welcome

**Nametags** bearing the club logo are available for \$5.00. If interested, please contact Dave, VE1NN

Check in to the EMO NET conducted by David, VE1EDA, each Sunday evening at 1930 local (7:30 PM) on VE1PSR repeater (147.27).

A couple is lying in bed. The man says, "I am going to make you the happiest woman in the world." The woman replies, "I'll miss you..."

Deadline for submissions to the May Reflector is Saturday, May 10, 2008

### GENERAL INFORMATION

1

Sunday evenings:

EMO Net: at 7:30 PM on 147.270 + TAKE-15 NET at 8:30 PM on 147.270 + (VE1PSR/VHF)

CLUB REPEATERS:

VE1PSR/VHF - 147.270 MHz + VE1PSR/UHF - 444.350 MHz + VE1PSR/6M - 53.550 MHz -

access tone 151.4 Hz

VE1HNS - 146.940 MHz -

PACKET:

VE1NSD 145.050 MHz LAN NODE

### Events for Your Calendar

May 4 – the MS Walk, Terry, VE1TRB is co-ordinating this event – ve1trb@eastlink.ca

Saturday May 31 – Loyalist City Amateur Radio Club Hamfest & Fleamarket at Quispamsis Middle School, 189 Pettingill Rd.,

Quispamsis NB

The last full weekend in June – the ARRL Field Day is June 28 and 29. Please contact John, VE1OZ to help out – johnbartlett@eastlink.ca

June – Museum Ships on the Air July 16 & August 20 – Pizza Nights

July 26 and 27 – MS Bike Tour, Rick, VE1RGG will be co-ordinating this event, please get in touch with him – rsgardiner@eastlink.ca

July 26 & 27 - IOTA weekend

August – The 7th International Lighthouse Day is intended to raise the profile of lighthouses, lightvessels and other navigational aids, promoting our maritime heritage.

Reserve August 21,22,23 &24 for taking part in the HARC 75th Anniversary Hamfest

Friday, August 22, 2008 — The Fifth Annual MARITIME DX FORUM

The 2008 Callbook will feature full colour on the covers and 4 tabbed advertising leaves (8 pages) that will separate major sections in the 2008 book. The 2008 callbook advertising rates for 2008 will be:

F	Regular	Tabs	Clubs
Full page	\$300	\$375	\$150
Half page	\$175	\$225	\$85
1/4 page	\$125	\$150	\$65
Buss. Card	\$90	\$110	\$45

Please be sure to let Scott know who you are planning to approach with respect to advertising BEFORE you talk with them, just to make sure that he or someone else has not already made the ask.

Thanks & 73 Howard, VE1DHD

Loyalist City Amateur Radio Club New Brunswick Spring Hamfest & Fleamarket Saturday May 31, 2008

Quispamsis Middle School, 189 Pettingill Rd., Quispamsis NB ARPS Node on Site - LCARCFM 45°25'35"N, 66°58'01"W

Directions to Quispamsis Middle School: Take exit 141 off of Highway 1 for Route 119N (about 20 km east of Saint John). At the stop lights, go approx. 3 km north on #119, past the lights at Hwy 100 to Alma Lane, turn left (west) and go 0.1 km and turn left onto Quispamsis Rd and at about 1 km bear right onto Pettingill Rd. and go 0.3 km to the school entrance.

DOORS OPEN AT 9:30 AM

Computer & electronic equipment VE9/VY2 QSL Bureau
Amateur Licence Exams
Satellite & APRS Demo
RAC Representatives
DXCC Card Checking
Canteen & Eyeball QSO area
Admission includes FREE ticket
for Grand Prize & Door Prizes
Grand Prize - 2m Handheld
40+ Door Prizes

To book a table contact Phil, VE1PGC at hamfest@lcarc.ca DOOR PRIZES & GRAND PRIZE Public 9:30AM Vendors 8:30AM Talk-in: 147.27+

Talk-in: 147.27+
Info at www.lcarc.ca

Jim Langille, VE1JBL, RAC Section Manager Maritimes, wants/needs to have 3 **Assistant Section Managers** in Nova Scotia; 1 in Cape Breton, 1 in HRM and 1 for the rest of the Mainland.

Job description; Assistant Section Managers - You'd be Jim's contact in your area, advising him of any happenings to keep the section up to date. Jim would also advise you of important info from the RAC to send out to the members in your area.

These are volunteer positions, but you have to be a full member of the RAC. If you would like to find out more about this position read the Section Manager and Assistant Section Manager page on the website. If you would like to help out your section, please let Jim know.

These and other positions to fill are on the Maritime Section website.

www.maritimeamateur.ca

From the ARRL Letter, Vol. 27, No. 13

The Des Moines Radio Amateur Association (DSMRAA) will hold their hamfest on April 27 at the 92.5 KJJY Event Center, located at 2100 NW 100th Street in Clive, Iowa

Dear Lord, I pray for
Wisdom to understand my man;
Love to forgive him;
And Patience for his moods.
Because, Lord, if I pray for Strength,
I'll beat him to death. AMEN

From the ARRL Letter, Vol. 27, No. 13 World Amateur Radio Day April 18

Each year on the anniversary of its founding, April 18, the International Amateur Radio Union (IARU) marks World Amateur Radio Day. On this 83rd anniversary of its inaugural meeting in Paris, the IARU dedicates World Amateur Radio Day to the future of Amateur Radio with its theme, "Amateur Radio: A Foundation for Technical Knowledge."

It is no secret that many professionals in the field of radio, TV, communications and electronics have started their technical education as young radio amateurs. Although Amateur Radio has a different face nowadays -- Digital Communications, Voice over Internet Protocol, Satellite up- and downlinks and more -- it is even of greater value as a foundation for technical knowledge for youngsters. And much more -- it is and should be used as a unique attraction for future young radio amateurs.

#### PRESIDENT'S MESSAGE

Can I safely say Spring is here?? The weather has finally begun to improve so antenna work is being planned in many places. Spring is also a warning that the year is passing rapidly and soon it will be summer and all the things happening in a short time frame. There are many events planned for this summer and the club will need you to help out in any way you can.

Speaking of events, the club has purchased generic business cards with the club logo, information and space for contacts and course contact. These can be given out at events when someone expresses an interest in Amateur Radio. If you are organizing an event or will be greeting the public on behalf of the club you can get some cards from the club office. See a executive member to obtain the cards.

We have a Field Day Chairman, John Bartlett, VE1OZ has agreed to take on this task. Please let him know how you wish to help. Myself and a few others gave John a quick briefing on possible contacts for various tasks and I hope you can help out.

The members of the 75th committee and subcommittees will be canvassing the membership for help with tasks during the 75th Hamfest in late August. We have a few volunteers and if you can think of any way you can help out please come forward. We will need people to man tables and booths, greet people, give directions and a multitude of other small tasks.

On another topic entirely we also need some people experienced in simple construction to rebuild the building at Cowie Hill that houses the repeaters. We hope to expand the building to accommodate club storage as well. This will depend on two things, one is the availability of space to expand and the availability of money to buy materials. The second requirement will be pursued by the executive. If you are interested please contact me.

73 - Bill, VE1MR

History Note Re: WW2 aircraft - the Allied radio operators would tune their receivers, typically an R1155, to 7 Mhz. If their receiver suddenly overloaded due to a strong local signal they knew a German night fighter was way toooooo close. The German night figters operated on a number of crystal controlled frequencies near 7 Mhz and received targeting instructions from German ground radar stations on that frequency. Later on the Allied aircraft were equipped with a receiver that detected the German night fighter radar which operated at about 400 MHz. When the receiver detected a signal it turned on a warning light on the pilots instrument panel. The receiver had such poor sensitivity that the pilot only had a few seconds to start evasive action before the night fighter was in a position to open fire. Normal evasion called for a sharp diving turn.

From Don, VE1AMC

Webmaster Bill Galloway, VE1WWG has been doing a lot of work on the HRM EMO/ ham Advisory Committee Web Site. If you haven't checked it out recently make it a point to do so at

www.ve1hre.ca



Saturday, April 5, was a long day for the group doing antenna work at the HARC station. Things fought back determinedly so there will need to be another session to accomplish the rest of the planned work. Terry, VE1TRB, took this picture of Dave, VE1DDC, working up the tower.

The famous Olympic skier Picabo Street (pronounced Peek-A-Boo) is not just an athlete.... she is now a nurse currently working at the Intensive Care Unit of a large metropolitan hospital. She is not permitted to answer the hospital telephones. It caused too much confusion when she would answer the phone and say, Picabo, ICU

As of September 15/07 the Mars "rover missions", originally intended to last 3 months, were approaching their 4th anniversary. Rover "Opportunity" and its twin, "Spirit", landed on the surface of Mars in 2004. September 2006 they reached the Victoria crater where they continue to explore.

Source, The Montreal Gazette, Sept.15/07

Visit the NSARA web site at...http://users.eastlink.ca/~bdeathe/NSARA/

## Safety Corner April 2008 by Terry, VE1TRB POST FALL SUSPENSION TRAUMA

### Ref: http://www.cdc.gov/elcosh/docs/d0500/d000568/d000568.html

The club now has a number of people trained in Fall Protection for working on roofs and towers. When working above ground level it is important for the ground crew to be aware of the importance of high angle rescue. Someone told me a while ago that there are dangers inherent in amateur radio especially with high voltages, rf burns from direct contact, etc. I'll bet he never thought about someone actually dying from being suspended from a safety harness!

Harnesses can become deadly whenever someone is suspended for duration over five minutes in an upright posture, with the legs relaxed straight beneath the body.

Most users of fall protection equipment, rescue personnel, and safety & health professionals remain unaware of this hazard. Many safety professionals naturally assume that, once a fall has been arrested, the fall protection system has successfully completed its job. Unfortunately, this is *not* the case. A worker suspended in an upright position with the legs dangling in a harness of any type is subject to suspension trauma.

When we installed the Keji (VE1KEJ) repeater system, because we were a long way from any professional rescuers, I wanted to make sure everyone on site would be able to respond to an arrested fall. What I did was climb about 40 feet up the fire tower, and carefully lowered myself to suspend freely in my harness.

With our high angle rescue gear all laid out, it took about 8 minutes for my "rescuers" to get me on the ground. Even after that short period, it took about 10 minutes for me to get back to "normal".

Reference 1 tells about a person that was suspended (under controlled conditions) for only 3 minutes who became unconscious. He had experienced a condition that could have killed him if it wasn't for the controlled conditions.

#### **Suspension Trauma**

Suspension trauma death is caused by orthostatic incompetence (also called orthostatic intolerance). What happens in orthostatic incompetence is that the legs are immobile with a worker in an upright posture. Gravity pulls blood into the lower legs, which have a very large storage capacity. Enough blood eventually accumulates so that return blood flow to the right chamber of the heart is reduced. The heart can only pump the blood available, so the heart's output begins to fall. The heart speeds up to maintain sufficient blood flow to the brain, but if the blood supply to the heart is restricted enough, beating faster is ineffective, and the body abruptly slows the

heart. In most instances the problem is solved by the worker fainting, which typically results in slumping to the ground where the legs, the heart, and the brain are on the same level. Blood is now returned to the heart and the worker typically recovers quickly. In a harness, however, the worker can't fall into a horizontal posture, so the reduced heart rate causes the brain's blood supply to fall below the critical level. Orthostatic incompetence doesn't occur to us very often because it requires that the legs remain relaxed, straight, and below heart level. If the leg muscles are contracting in order to maintain balance and support the body, the muscles press against the leg veins. This compression, together with well-placed one-way valves, helps pump blood back to the heart. If the upperlegs are horizontal, as when we sit quietly, the vertical pumping distance is greatly reduced, so there are no problems. In suspension trauma, several unfortunate things occur that aggravate the problem. First, the worker is suspended in an upright posture with legs dangling. Second, the safety harness straps exert pressure on leg veins, compressing them and reducing blood flow back to the heart. Third, the harness keeps the worker in an upright position, regardless of loss of consciousness, which is what kills workers.

## What can be done to reduce the risks of Suspension Trauma

After a fall:

- 1. Climbers should be trained to try to move their legs in the harness and try to push against any footholds.
- 2. If the climber is suspended upright, emergency measures must be taken to remove the worker from suspension or move the fallen climber into a horizontal posture, or at least to a sitting position.
- 3. Fall victims can slow the onset of suspension trauma by pushing down vigorously with the legs, by positioning their body in a horizontal or slight leg-high position, or by standing up. Harness design and fall injuries may prevent these actions, however.

For harness rescues:

- 1. The victim should not be suspended in a vertical (upright) posture with the legs dangling straight. Victims should be kept as nearly horizontal as possible, or at least in a sitting position.
- 2. Rescuers should be trained that victims who are suspended vertically before rescue are in a potentially fatal situation.
- 3. Rescuers must be aware that post-rescue death may occur if victims are moved to a horizontal position too rapidly.

Rescue must come rapidly to minimize the dangers of (Continued on page 5)

(Safety Corner Continued from page 4)

suspension trauma. The circumstances together with the lanyard attachment point will determine the possibilities of self-rescue. In situations where selfrescue is not likely to be possible, climbers must be supervised at all times. Regardless of whether a climber can self-rescue or must rely upon others, time is of the essence because a climber may lose consciousness in only a few minutes. If a climber is suspended long enough to lose consciousness, rescue personnel must be careful in handling such a person or the rescued climber may die anyway. This post-rescue death is apparently caused by the heart's inability to tolerate the abrupt increase in blood flow to the right heart after removal from the harness. Current recommended procedures are to take from 30 to 40 minutes to move the victim from kneeling to a sitting to a supine position.

## REMEMBER SAFETY IS EVERYONE'S BUSINESS

If you have any comments or questions that you would like to see addressed in this column, please feel free to send me an email at ve1trb@eastlink.ca

From the ARRL Letter, Vol. 27, No. 13

The Trans-Atlantic balloon flight of the Spirit of Knoxville V is set to launch April 5 at 2000 EDT (0000 UTC April 6). The balloon, designed to stay aloft for more than 24 hours, will be inserted into the current jet stream at normal flight altitudes of 30,000-40,000 feet. This will take the balloon into Europe over the UK and France at around 40 hours into the flight if all goes well. Using radio frequencies, the balloon transmits data detailing its current location, distance travelled, speed, height and health of the balloon. Last month, the Spirit of Knoxville IV made two-thirds of its journey and crossed the tectonic plate to Europe; organizers hoped the balloon would make to Europe, but after 40 hours and 3300 miles, the balloon lost altitude and went into the ocean as it neared Ireland. The balloon's payload consists of hand-made computers and radios along with a GPS and self-authored software. The onboard computer gathers information from the GPS like altitude, speed and temperature; the computer then determines whether it needs to drop weight to maintain its altitude and sends this information, via Amateur Radio frequencies, to volunteers around the globe. See the Spirit of Knoxville Web page <a href="http://www.spiritofknoxville.com/">http://www.spiritofknoxville.com/</a> for more info.

He said ... What have you been doing with all the grocery money I gave you?

She said .....Turn sideways and look in the mirror!

A Windy Dilemma Brought to our attention by Al, VO1NO

DND wants to examine whether wind turbine farm will affect radar By Brian Medel, Yarmouth Bureau

YARMOUTH - Wind turbines and national defence. Does one make you think of the other? The military thinks so and wants to scrutinize any plans to build a wind turbine farm within 100 kilometres of air defence radar, or within 60 kilometres of air traffic control radar.

The air force now operates a coastal defence radar site on a windswept, rocky outcrop at Baccaro Point, Shelburne County. As the crow flies that's about 30 kilometres from a wind turbine farm at Pubnico Point, Yarmouth County. Could Pubnico Point endanger national security?

"That's a difficult question," said Jim Hawkes, a civilian engineer with the Canadian Forces in Ontario. The Pubnico Point wind farm was never evaluated by the military as to its possible impact on the radar site. "It was put up and in operation before ... we even started assessing them," said Mr. Hawkes, Many trials were done in Europe and that's where the radar effect came to light, he said. "We started (studying the issue) ... roughly two years ago." A report completed in October of 2006, and published by the Radio Advisory Board of Canada, outlines some of the concerns and potential risks. Mr. Hawkes said he wrote part of the report.

In a section on radar, the report states that where wind turbines are in line of sight to a radar installation, "the turbines can appear as genuine aircraft targets." And that could be hazardous to flight safety, the report suggests. Another concern is the loss of detection of some aircraft flying close to or above wind turbines, said the report. "(Air defence) radar operators need to ensure that all unidentified aircraft, which could pose a threat, can be accurately and reliably tracked," read the report. "The only reported effect that I know of is in Sault Sainte Marie," Mr. Hawkes said about a radar system affected by wind turbines. It's not military radar, he said. "They're just simply living with it," said Mr. Hawkes. The Department of National Defence has contacted Barrington Municipal Council and asked that any future wind turbine proposal for the area near the Baccaro radar station be reviewed by the military before council gives its OK. "I have been in contact with the various people in Ottawa who are responsible for that radar and to the best of my knowledge we have not received any adverse effects from Pubnico," said Mr. Hawkes. The Atlantic Wind Power Corp. operates 17 wind turbines at Pubnico Point and no one from the company was available for comment on Monday.

There are no laws prohibiting wind turbines near radar sites but Department of National Defence experts say they'd like to talk with proponents if turbines are planned within the potential risk zone, said Mr. Hawkes. "The wind turbine has to be in the line of sight. You might have a hill in between the wind turbine and the radar and you'll get no effect," he said. A U.K. company is developing some sort of an electronic device, however, which can be put on radar to mitigate any effects from wind turbines. (bmedel@herald.ca <mailto:bmedel@herald.ca>)

#### Halifax Amateur Radio Club Minutes of the General Meeting March 19 2008

**Welcome:** President Bill Elliott, VE1MR, called the meeting to order at 19:40 hours.

Silent keys: None noted.

**Approval of the Agenda**: Corrections and an addition were made to the Agenda.

**Motion**: THAT the agenda be accepted as distributed.

Moved by Murray MacDonald, VE1MMD. Seconded by Doug Leblanc, VE1LDL. Approved.

**Guests/visitors:** No guests being present, members introduced themselves.

**Minutes:** There were no errors or omissions noted for the minutes of February 20, 2008.

**Motion**: THAT the minutes of the February regular meeting be approved as printed in the March Reflector.

Moved by Win Hartlen, VE1WIN Seconded by David Musgrave, VE1EDA. Approved.

#### REPORTS

#### **Treasurer:**

Fraser MacDougall, VE1WO, reported an income of \$2, 246.71 expenses of \$1,232.55, with a balance of \$11,\_\_\_\_\_. See attached report for details.

**Motion**: THAT the treasurer's report be accepted as presented.

Moved by Emil Pineau, VE1ESP. Seconded by Tom Caithness, VE1GTC. Approved.

#### Secretary:

Helen MacRae, VE1HMR, reported that a get well card was sent to Nigel Service, VE1NPS, on behalf of club members. Rental for the club postal box of \$136.73 was paid and the secretary reimbursed.

#### **President:**

MS Walk: Bill Elliott, VE1MR, advised that Terry Bigalow, VE1TRB, will coordinate the MS Walk, Sunday May 4<sup>th</sup>. It will begin at 2 p.m. and Terry would like to have 2 more vol-

unteers. Members were asked to contact Terry if they can assist; also, organizers would like help setting up in the morning on site at the Dalhousie Arena; please help if you're able.

1<sup>st</sup> Vice-President: Position vacant.

2<sup>nd</sup> Vice-President: Tom Gaum, VE1BMJ, noted the door prize to be an up-right alarm clock with weather station.

Station Manager: Brian Allan, VE1AZV, advised that members will try to bring down the beam this Saturday to deal with its very high PSR. There is also the new sloper antenna to install and a work date of Saturday, April 5<sup>th</sup> set (March 29<sup>th</sup> is a Dx contest day), weather permitting.

<u>Director at large:</u> Doug Leblanc, VE1LDL:

Past President: No report (away)

#### **Committee reports:**

Membership: Howard Dickson, VE1DHD, reported the club currently has 4 life members, 16 associate, 100 full members, plus 4 renewals this evening for a total of 124.

Call book: Howard Dickson, VE1DHD, gave a rough draft of the non-database (filler) material prepared for the call book. Sheldon Page is doing the layout for us. The bulk of the call book will be the database, which will not be downloaded for several weeks. Helen Archibald, VE1YL and Lynn Bowser, VE1ENT, will proof read the manuscript. Howard expressed a concern that the club attempt to cover as much of the printing cost as possible through advertising. Five members suggested candidate companies last month and four have purchased advertising space. Any member with personal contacts is urged to check with Howard.

Questionnaires – Murray Mac-Donald, VE1MMD, reported that 62 questionnaires have been returned valid (completed and signed). Three were undeliverable due to unknown changes of address and one came back completed but without a signature so cannot be included. At present, this gives a 40% return, which is excellent; however, Murray noted many completed questionnaires have been sent in by amateurs who are not regular HARC members. Members who have not yet done so are urged to complete, sign and return their questionnaires right away.

Cell Phone Legislation: Murray MacDonald, VE1MMD, called members attention to the copy of the Minister of Transportation's response to Murray's query about amateur radio usage as it relates to upcoming legislation in the current issue of The Reflector. Secondly, he advised that California has enacted cell phone legislation that specifically excludes amateur radio and will try to locate that literature.

Community Grant: Murray Mac-Donald, VE1MMD, reported that preparation of a grant submission is underway for funding up to \$15,000. A detailed report on this project will be given at the April general meeting.

<u>Basic radio course</u>: Barry Diggins, VE1TRI, not present. No report.

EMO/SAR— Dave George, VE1AJP, reported that a SAR exercise held two weeks ago resulted in a real-life response affecting several fire stations that subsequently proved to be a participant role-playing with conviction. In the exercise noted, new-to-the-role participants did not know the meaning of "no duff". The lesson: always ensure there is a mechanism for ending an exercise should a valid incident occur to prevent deployment of on-duty response teams.

Archives: Rod Padmore, VE1BSK, has been spending significant time reviewing newspapers published during the war years (four published daily of 20 pages, some 2400 pages per month) using Wednesdays in April 1940 as a test month seeking write ups about HARC meetings that were reported in a weekly column. Nothing has been found to date and

(Continued on page 7)

**Minutes** (Continued from page 6)

Rod asks members to contact him if they know what the column was called and/or if they know that HARC met on Wednesdays as believed.

Old Business: Nil

#### **New Business:**

<u>Computer update:</u> Brian Allan, VE1AZV, advised that the \$197.50 approved for updating computer RAM proved to be insufficient.

**Motion:** That HARC approved the update of computer RAM up to a total of \$250.

Moved by Brian Allan, VE1AZV. Seconded by Emil Pineau. Approved.

<u>Election</u>: On behalf of the Nominating Committee chaired by Howard Dickson, VE1DHD with members Win Harlin, VE1WIN and Scott Wood, VE1QD, invited Murray MacDonald, VE1MMD to stand for election to the position of 1<sup>st</sup> Vice-President: No further nominations from the floor. Acclaimed.

New Committee: Herb Doane, VE1HTD, entered a motion that a HARC-CRC Committee be established:

Recognizing the role of HARC in coordinating the services of amateur radio operators in responding to emergencies, and recognizing that Canadian Red Cross has special responsibility for responding to humanitarian emergencies, and recognizing that Red Cross Volunteer amateur radio operators are expected to respond to Red Cross emergencies, and recognizing that some equipment used by Red Cross is now vested in HARC, we, the members of the Red Cross Emergency Communications (RCEC), wish to affirm a continuing close liaison between CRC and HARC and offer the following:

#### **Motion**:

THAT a new committee be formed within HARC to liaise between HARC and the Red Cross Volunteers undertaking to be emergency amateur radio operators (RCEC) with Canadian Red Cross in Nova Scotia. Seconded by Helen MacRae, VE1HMR.

Approved.

HARC members who recently acted in an advisory capacity to the RCEC group, VE1MR, VE1GTC, VE1MMD and VE1AZV agreed to serve on the HARC-CRC committee. Bill Elliott, VE1MR invited other members wishing to serve on this committee to contact him.

75<sup>th</sup> Celebrations: Scott Wood, VE1QD, reported that he and his team continue to work on the arrangements for the HARC75th. Dave Sumner, K1ZZ, CEO of the American Amateur Relay League (AARL) has agreed to participate. An invitation has been forwarded to RAC's President, Dave Goodwin, VO1AU/VE3AAQ. An interesting program is shaping up. Watch for updates on www.harc75.ca

50/50 Draw: Sam, VE1YVN, won the 50/50 draw totalling \$26.00

<u>Door Prize:</u> Emil, VE1ESP, won the up-right clock/weather station door prize.

**Motion**: THAT there being no further business, Murray, VE1MMD, moved the meeting be adjourned at 20:20.

A short break was taken after which Guest speakers, Neil Hughes, VE1YZ and Don Trotter, VE1DTR gave an interesting presentation about WinLink.

Respectfully submitted, Helen MacRae, VE1HMR, Secretary

If Wal-Mart is lowering prices every day, how come nothing is free yet?

History was made at 12:02 AST, Sunday March 9, 2008 when the European Space Agency (ESA) successfully launched the ATV (Automated Transfer Vehicle) resupply vehicle named "Jules Verne" in support of International Space Station operations. In additition to the Russian Progress supply spacecraft the ATV will provide an important logistic and supply missions and will provide re-boost capability to the ISS. ATV "Jules Verne" will be docking with the ISS April 3, 2008.

Soyuz (crew transfer), Progress and ATV (logistics) will be critical to ISS operations once the US Space Transportation System or STS (Shuttle) is retired in late 2010.

Docking of both the Progress and ATV vehicles are fully automated. The ATV launch is the second success of ESA following the February on-orbit deployment of the Columbus Module during STS-122

For more information on ESA / ATV Operations visit http://www.esa.int .

73 Wayne, VE1WPH, VE1ISS

#### Answer to Puzzler on page 1

Radio Amateurs can use GHA
"Greenwich Hour Angle" formula to calculate the position of both celestial and earth locations. It is used for aiming an antenna for moon bounce communications. The formulas can also be used to calculate the position of satellites in earth orbit, either periodic or stationary.

From the ARRL Letter, Vol. 27, No. 13

Students at the Universite de Liege in Belgium have built OUFTI-1 <a href="http://www.leodium.ulg.ac.be/cmsms/">http://www.leodium.ulg.ac.be/cmsms/</a>, a new Amateur Radio CubeSat featuring D-STAR digital-communication protocol that is used for control and telemetry. Amateur Radio operators from all over the world are able to listen in on the ONOULG D-STAR repeater on 70 cm <a href="http://www.jfindu.net/dstarlh.aspx?rptr=ONOULG">http://www.jfindu.net/dstarlh.aspx?rptr=ONOULG</a>; 2 meters will be operational soon. The objective of this nanosatellite project is to provide hands-on experience to students in the design, construction and control of complete satellite systems, ultimately serving as the basis for a variety of space experiments. The first satellite in the series, OUFTI-1, is a CubeSat -- a  $10 \times 10 \times 10$  cm cube weighing in at no more than one kilogram. -- Information provided by the OUFTI Team

#### From Dave, VO1AU/VE3AAQ

FYI, my President's Message in May/June TCA is all about investing in the future of Amateur Radio. In my penultimate paragraph, I included the following:

#### A Great Example in Halifax

The Halifax ARC marks its 75th anniversary this year. This is a club that honours its past, but looks to the future. On the weekend of 21-24 August, at the Down East Amateur Radio Festival (see www.harc75.org), Halifax ARC members will award the first Brit Fader Scholarship. The late Brit Fader VE1FQ was an institution in Amateur Radio in the Maritimes: For many years he singlehandedly managed the VE1 incoming QSL Bureau, he was a major force in the Halifax ARC and he was the first ever Canadian Radio Amateur of the Year, when that award was created by RAC's predecessor, CRRL, in 1976.

The Brit Fader Scholarship fund now totals over \$10,000 and was created by the donations of many individual Amateurs - people who live in the present, but who are inspired by the past, and look to the future. Brit represented the history of Amateur Radio in the Maritimes. The scholarship that bears his name looks to the future: it will be awarded to young Radio Amateurs in the Maritimes to support their post-secondary studies.

Dave, VO1AU/VE3AAO

Dave is the President of RAC. ed.

From the ARRL Letter, Vol. 27, No. 13

Annual Armed Forces Day (USA) Crossband Test to be May 10

The Army, Air Force, Navy, Marine Corps and Coast Guard are co-sponsoring the annual Military/Amateur Radio communications tests in celebration of the 58th anniversary of Armed Forces Day (AFD). The AFD Military/Amateur Crossband Communications Test will be conducted on May 10.

The annual celebration features traditional military to amateur crossband communications SSB voice tests and copying the Secretary of Defense message via digital modes

Schedules and frequencies of participating military stations to be published in May on the Army MARS Web site <a href="http://www.">http://www.</a> netcom.army.mil/MARS>

Thanks to Helen, VA1YL, for this recipe – An engineer's version of a recipe for Chocolate Chip Cookies:

*Ingredients:* 

532.35 cm3 gluten

4.9 cm<sup>3</sup> NaHCO3 4.9 cm<sup>3</sup> refined halite

236.6 cm<sup>3</sup> partially hydrogenated

tallow triglyceride

177.45 cm<sup>3</sup> crystalline C12H22O11 177.45 cm<sup>3</sup> unrefined C12H22O11

4.9 cm<sup>3</sup> methyl ether of protocatechuic aldehyde Two calcium carbonate-encapsulated avian

albumen-coated protein

473.2 cm³ theobroma cacao

236.6 cm<sup>3</sup> de-encapsulated legume meats (sieve size #10)

To a 2-L jacketed round reactor vessel (reactor #1) with an overall heat transfer coefficient of about 100 Btu/F-ft2-hr, add ingredients 1, 2 & 3 with constant agitation. In a second 2-L reactor vessel with a radial flow impeller operating at 100 rpm, add ingredients 4, 5, 6, & 7 until the mixture is homogenous. To reactor #2, add ingredient 8, followed by 3 equal volumes of the homogenous mixture in reactor #1. Additionally, add ingredient 9 & 10 slowly, with constant agitation. Care must be taken at this point in the reaction to control any temperature rise that may be the result of an exothermic reaction.

Using a screw extrude attached to a #4 nodulizer, place the mixture piece-meal on a 316SS sheet (300 x 600 mm). Heat in a 460K oven for a period of time that is in agreement with Frank & Johnston's first order rate expression (see JA-COS, 21, 55) or until golden brown. Once the reaction is complete, place the sheet on a 25C heat-transfer table, allowing the product to come to equilibrium.

The cost of living hasn't affected its popularity.

#### 2008-2009 ARRL REPEATER DIRECTORIES NOW SHIPPING From the ARRL Letter, Vol. 27, No. 13

With more than 20,000 listings for VHF/UHF repeaters across the US and Canada, "The ARRL Repeater Directory 2008-2009" is available in 2 sizes -- pocket size <a href="http://www.arrl.org/catalog/?item=1271">http://www.arrl.org/catalog/?item=1271</a> and desktop <a href="http://www.arrl.org/catalog/">http://www.arrl.org/catalog/?item=1271</a> and desktop <a href="http://www.arrl.org/catalog/">http://www.arrl.org/catalog/<a href="http://www.arrl.org/catalog/">http://www.arrl.org/catalog/<a href="http://www.arrl.org/catalog/">http://www.arrl.org/catalog/<a href="http://www.arrl.org/">http://www.arrl.org/<a hre arrl.org/catalog/?item=1298>rom the ARRL Online Store <a href="http://www.arrl.org/catalog/?category=What's%20New">http://www.arrl.org/catalog/?category=What's%20New</a>

This year the pocket-sized Repeater Directory boasts a larger font size, making for easier reading. For the first time this year's editions feature indexing tabs on the cover, easier to read listings and a "Key to Repeater Notes" located right up front in the Directory.

Along with these new features, both editions have the features you know and enjoy from prior years: Repeater operating practices, repeater lingo and hints for newly licensed hams; Frequency Coordinator contact information; listings for D-Star and APCO 25 repeaters; a guide to using CTCSS tones and Digital Coded Squelch (DCS); VHF/UHF band plans and a 2 meter channel-spacing map; IRLP (Internet linked) nodes; tips for handling interference; listings for IRLP, WIRES-II and EchoLink nodes; emergency message handling procedures, and a transceiver memory log.

### Part 2 - Touch Lamp Interference Solution

by H. Paul Robinson, VE1AVD

Modifications to TP-01 Touch Lamp Control Module

### **Introduction:**

**APPENDIX** 

## Modifications to TP-01 Touch Lamp Control Module

CAUTION: This modification is to an ac-line connected device and should be performed only if you are experienced with this kind of work.

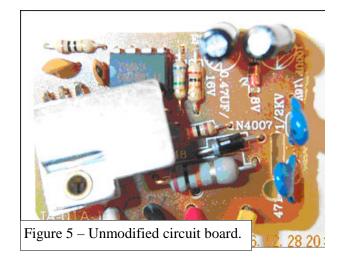
The author assumes no liability.

Module

The following step-by-step procedure can be used to add the 'touch lead' filter. These instructions apply to the module type identified by the following:

- 'Zing Ear' model TO-01 or TP-01 ZH;
- Atron model TD104;
- Canadian Tire stock number 52-3108-8.
- Kent Building Supplies stock number 20-6860600. This unit is built around the 8-pin CMOS TT6061A chip.

The circuit board for this unit is shown in figure 5. Modification

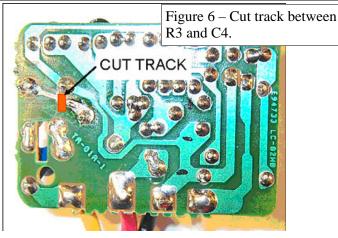


The following components are required:

- C101, C102: capacitor, ceramic, radial, 82 pF, 1 kV, BC Components DD-820.
- L101: inductor, axial, 2200 μH, JW Miller 9250-225.

Filter components will be added to the top right corner of the circuit board. To accommodate the filter circuit, a circuit track between R3 and C4 is cut as shown in figure 6.

Driving etiquette – The car horn is an auxiliary instrument for judicious use in limited circumstances. Turn signals, however, are not optional.



Four holes are drilled in the board to permit the installation of the 3 new filter components. The holes are located near tracks to which the components will be connected and must also clear the top-side components. A 0.055-inch diameter hole will just allow two component leads to fit. The holes need to be close to the Vss track and the cut track as shown in Figure 8 and drilling the holes from the bottom may be easier. Do not damage existing components while drilling

the holes. Keep the new components away from C3 and both C3 tracks. Under some circumstances the voltage on C3 may be high. This can happen when the lamp 'user' has accumulated a static charge and touches the lamp base for

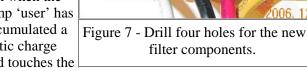


Figure 8 -Bottom view of the new component holes.

example.

Add C101, C102, and L101 by feeding their



leads through the new holes. Add Teflon sleeve to the

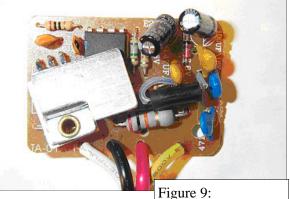
(Continued on page 10)

(Touch Lamp Interference Solution Continued from page 9)

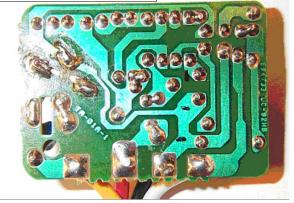
inductor leads as required. Ensure that the new component leads do not come in contact with other conductors.

Solder the components to the tracks as shown. One lead of each capacitor connects to the **Vss** track.

Figure 10 – Components connected to board tracks.



gure 9:
Filter components mounted to board.



Reinstall the circuit board in the original housing.

This completes the modification.

Figure 11: Completed unit.

Further study:

A close approximation to the touch sensor module circuit can be found in the Tontek Design Technology Ltd. TT6061A/TT8486A chip data sheet available at:

http://www.datasheetcatalog.com/datasheets\_pdf/T/T/6/0/TT6061A.shtml

or

http://cn.100y.com.tw/pdf\_file/TT6061A.pdf

Another good diagram can be found in *Electronics For You*, December 2003 available from: http://www.electronicsforu.com/EFYLinux/circuit/dec2003/CI-06-touch-dimmer.pdf

For more information see the references.

**Customer:** I'm trying to connect to the Internet with your CD, but it just doesn't work. What am I doing wrong?

**Tech support:** OK, you've got the CD in the CD drive, right? **Customer:** Yeah....

**Tech support:** And what sort of computer are you using?

Customer: Computer? Oh no, I haven't got a computer. It's in the CD player and all I get is weird noises. Listen ...

**Tech support:** Aaaarrrrgggghhhh!!!



The older we get, the fewer things seem worth waiting in line for.

#### References

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H. Paul Robinson, P.Eng., SMIEEE, VE1AVD, received his degree in Electrical Engineering from the Technical University of Nova Scotia. He is an electronics circuit designer and consultant in the oil drilling industry. He received his Amateur licence in 1968 and Advanced Amateur in 1969.

Distribution World, September 2004.

Powerpole connectors for sale at \$1.25 each (for a red and black connector for one complete end ). To make a complete mating pair will require 2 connectors. If you have not already converted all your gear to Powerpole connectors you should consider doing so. Place orders with Tom Caithness, VE1GTC, by E-mail tom.caithness@ns.sympatico.ca